

Section B - Supplies or Services and Prices

ITEM NO	SUPPLIES/SERVICES	QUANTITY	UNIT	UNIT PRICE	AMOUNT
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0001

1

Lot

SERVICES

FFP

PROVIDE PHYSICS AND MATERIAL SCIENCE EXPERTISE TO SUPPORT THE DEVELOPMENT OF MAGNETOSTRICTIVE MATERIALS (Fe-BASED MAGNETOSTRICTIVE ALLOYS, TERFENOL-D) FROM BASIC RESEARCH AND MATERIAL DEVELOPMENT THROUGH APPLICATIONS, TAKING INTO ACCOUNT THE VARIOUS AND UNIQUE NAVY REQUIREMENTS FOR THE ENTIRE BREADTH OF NAVY NEEDS FROM UNDERWATER TRANSDUCERS AND SENSORS TO SHIPBOARD VIBRATION CONTROL AND ENERGY HARVESTING IN ACCORDANCE WITH THE ATTACHED STATEMENT OF WORK.

THIS REQUIREMENT WILL BE INCREMENTALLY FUNDED.

FOB: Destination

PURCHASE REQUEST NUMBER: 53221855

NET AMT

Section C - Descriptions and Specifications

STATEMENT OF WORK**MAGNETOSTRICTIVE MATERIALS RESEARCH AND DEVELOPMENT EXPERTISE
STATEMENT OF WORK****1. TITLE**

1.1 Scientific and technical support for NSWCCD, West Bethesda, Advanced Materials Branch (617).

2. OBJECTIVE/BACKGROUND

2.1 Provide physics and material science expertise to support the development of magnetostrictive materials (Fe-based magnetostrictive alloys, Terfenol-D) from basic research and material development through applications, taking into account the various and unique Navy requirements for the entire breadth of Navy needs from underwater transducers and sensors to shipboard vibration control and energy harvesting. Transducers and actuators ranging in size from nanoscale through large, high power projectors will be addressed. Performance over a wide range of temperature and shock loads as required by Naval systems and well beyond those experienced in the commercial sector, must be addressed and analyzed to assure both near and far-term performance. Specific tasking will be defined in writing, including description of effort, schedule, and deliverables, based on this base SOW.

3. SCOPE OF WORK

The contractor must be a PhD physicist with demonstrated extensive knowledge of and experience in the magnetic and magnetoelastic properties, e.g. magnetostriction, permeability, piezomagnetic constant, elastic moduli, and magnetic anisotropy of magnetostrictive materials. Specific and significant experience (more than 25 years) must be demonstrated in the development of Navy and DoD-specific magnetostrictive materials such as Terfenol-D, Galfenol and high magnetoelastic coupling coefficient sensor materials and must have demonstrated the ability to formulate theoretical models for magnetostrictive materials. Experience aggregating more than 25 years is required with the following specific alloy systems: magnetostrictive RFe₂ and Fe-Ga alloy systems, where R is one or more rare earths for the temperature range of -60°C to 80°C; alloy design, e.g. proper choice of the rare earth components for the RFe₂ alloys and proper choice of Ga and X (Mn, V, Al, Co, etc.) for the Fe-Ga-X alloys to achieve desired transduction performance; high magnetoelastic coupling coefficient sensor materials. Also required is extensive knowledge of the use of these materials in Navy devices, e.g. vibration dampers, low frequency and piezomagnetic/piezoelectric hybrid transducers, and magnetic field sensors. The contractor shall provide technical services to 617 for typical tasks that include:

3.1 Sonar Transducer Materials Development

- 3.1.1 High-Strength Alloys with Moderate Magnetostriction Development - Current alloys with giant magnetostriction are quite brittle and expensive. A need exists to develop less expensive, stronger alloys with magnetostrictions ~ 200 ppm. Alloys will be based upon bcc Fe with primary additions of Ga, Al, and Co, and

minor additions of Cr, Mn, and B. Structures investigated will be B2 (CsCl), D0₃ (BiF₃) and L1₂ (AuCu₃). The effect of the dependence of the concentration of Ga, Al, and Co on the magnetization, magnetic anisotropy, and magnetostriction will be examined over a broad temperature range from cryogenic temperatures to above room temperature.

- 3.1.1.1 The effect of the dependence of the concentration of Ga in Fe-Ga alloys on the magnetization, magnetic anisotropy, and magnetostriction will be examined in detail. Emphasis will be on the “double” peak nature of the magnetostriction.
- 3.1.1.2 Annealing of Fe-Ga alloys under compression and/or magnetic field - Annealing of Galfenol (Fe-Ga) alloys in the range of 19% Ga has shown that an internal anisotropy energy can be developed. This allows for transducer operation of these alloys under tension up to 7 ksi. This important feature will be examined extensively. Annealing would be accomplished under both compression, tension and magnetic fields. Of great importance is the possibility to achieve near perfect magnetomechanical transduction ($k \approx 1$) under tensile operation when the product of the tensile load and the saturation magnetostriction equals the built-in anisotropy.
- 3.1.1.3 Dynamic performance of Galfenol alloys under tensile loads - The transduction properties of stress-annealed Galfenol under tension will be examined at low frequencies (10 Hz – 100 Hz) to extend the results obtained with the previous pseudo-static measurements.
 - 3.1.1.3.1 Strain output, power output and frequency dependence will be determined for various Ga compositions and annealing conditions. The issues of eddy currents and magnetic circuits will be investigated.
- 3.1.1.4 Aging studies of stress-annealed Galfenol alloys - Many of the transduction features of the annealed alloys depend upon their stability. It is important to determine the highest temperature of operation before the magnetostrictive properties degrade.
 - 3.1.1.4.1 Time/temperature studies will be performed for samples prepared under different annealing conditions. In view of these findings, the optimum annealing conditions will be determined.
- 3.2 Theoretical Investigation of Magnetoelasticity
 - 3.2.1 Investigation into the physical origin of the magnetoelastic fundamentals leading to the large magnetostriction of the Fe based alloys will be made, including analysis of elastic properties data and saturation magnetostrictions.
- 3.3 Energy Harvesting
 - 3.3.1 Magnetomechanical alloys can be utilized to take unwanted vibration energy and converting into useful electrical energy. It is important to discern and evaluate the feasibility of converting unwanted mechanical energy (or noise) into useful electrical power using Galfenol and Terfenol transduction devices.
- 3.4 Ultrasensitive Magnetic Field Sensors
 - 3.4.1 Ultrasensitivity depends on a large value of magnetomechanical coupling k .

Properly field annealed iron-based amorphous ribbons have large values of k , but even larger values of k are theoretically possible. The mechanisms that limit k in current materials, e.g. geometry (demagnetizing fields), imperfections and inhomogeneities, will be explored.

4. GFI

- 4.1 All applicable technical data including drawings, technical manuals, appropriate and relevant supporting documentation, and sources of scientific information shall be made available by 617 or the West Bethesda technical library.

5. GFE

- 5.1 The contractor shall be required to work at the government facility located in West Bethesda, MD or at the contractor's facility as requested by the government representative in charge of the project.
- 5.2 The government shall provide workspace and necessary resources to the contractor if available.
- 5.3 The contractor may be required to provide computer equipment for contractor personnel.
- 5.4 The contractor may be required to purchase incidental supplies, not to exceed 20% of total contract value.
- 5.5 The contractor is required to support facilities and equipments with specialized expertise, not to interfere with routine maintenance, but to assure optimum performance for the specific tasking required by this statement of work, as follows:
- 5.5.1 Calibration, modification, and operation of existing:
 - 5.5.1.1 Magnetic materials characterization systems, including:
 - 5.5.1.1.1. Vibrating sample magnetometer
 - 5.5.1.1.2. High magnetic field electromagnet
 - 5.5.1.1.3. Load frames with magnetoelastic measurement capabilities
 - 5.5.1.2 Network/spectrum analyzers
 - 5.5.1.3 Environmental Chambers
 - 5.5.1.4 Furnaces
 - 5.5.1.5 Power Supplies

6. PERFORMANCE AND DELIVERY

- 6.1 All technical support shall be completed NLT 18 months from date of award.

6.2 The contractor shall provide copies of technical information and/or electronic copies of all initiatives as requested by the project technical lead. This includes, but is not exclusive to:

6.2.1 Scientific Reports

6.2.2 Facilities and Equipment modification Documentation

6.2.3 Support on Proposals

6.3 The contractor will provide presentations to peer groups and sponsors as required and relevant to tasking specified, and the format specified, including, but not exclusive to:

6.3.1. PowerPoint

6.3.2. MS Office

6.4 The contractor will coordinate efforts and exchange information with other contractors and government professionals as required and relevant to tasking specified.

7. CONFERENCES AND MEETINGS

7.1 The contractor shall be available for frequent (average 3 – 5 times per week) meetings to be held at NSWCCD, West Bethesda, MD or other location as identified by the technical leader.

7.2 The contractor shall possess the requisite clearance to attend meetings at the SECRET level.

8. TRAVEL

8.1 Local and/or long distance travel may be required to meet project objectives. The technical lead will alert the contractor when and where travel is required.

9. SECURITY REQUIREMENTS

9.1. Personnel with classified clearance at the SECRET level are required.

10. TECHNICAL POINT OF CONTACT

10.1 Ms. Marilyn Wun-Fogle, (301) 227-5968, Fax (301) 227-5434, marilyn.wun-fogle@navy.mil.

10.2 Dr. James Restorff, (301) 227-5440, james.restorff@navy.mil

11. SERVICES INFORMATION

- 11.1 The contractor shall not exercise personal judgment on behalf of the Government.
The Government shall not assign sub-tasks or prepare work schedules but shall allow the contractor to meet delivery schedules established in the overall task or project. The technical lead shall monitor work via contractor reports as requested.

Section F - Deliveries or Performance

DELIVERY INFORMATION

CLIN	DELIVERY DATE	QUANTITY	SHIP TO ADDRESS	UIC
0001	18 mths. ADC	1	NAVAL SURFACE WARFARE CENTER, CARDEROCK RECEIVING OFFICER CODE 3341, RECEIVING, BLDG 143 9500 MACARTHUR BLVD. WEST BETHESDA MD 20817-5700 301-227-1840 FOB: Destination	N00167

Section I - Contract Clauses

CLAUSES INCORPORATED BY REFERENCE

52.204-2	Security Requirements	AUG 1996
52.245-2	Government Property (Fixed Price Contracts)	MAY 2004
52.249-8	Default (Fixed-Price Supply & Service)	APR 1984
252.227-7013	Rights in Technical Data--Noncommercial Items	NOV 1995
252.232-7007	Limitation Of Governments Obligation	AUG 1993

CLAUSES INCORPORATED BY FULL TEXT

52.213-4 Terms and Conditions--Simplified Acquisitions (Other Than Commercial Items) (JUL 2005)

(a) The Contractor shall comply with the following Federal Acquisition Regulation (FAR) and Defense Federal Acquisition Regulation Supplement (DFARS) clauses that are incorporated by reference:

(1) The clauses listed below implement provisions of law or Executive order:

- (i) 52.222-3, Convict Labor (June 2003) (E.O. 11755).
- (ii) 52.222-21, Prohibition of Segregated Facilities (Feb 1999) (E.O. 11246).
- (iii) 52.222-26, Equal Opportunity (Apr 2002) (E.O. 11246).
- (iv) 52.225-13, Restrictions on Certain Foreign Purchases (Mar 2005) (E.o.s, proclamations, and statutes

administered by the Office of Foreign Assets Control of the Department of the Treasury).

- (v) 52.233-3, Protest After Award (Aug 1996) (31 U.S.C. 3553).
- (vi) 52.233-4, Applicable Law for Breach of Contract Claim (OCT 2004) (Pub. L. 108-77, 108-78)

(2) Listed below are additional clauses that apply:

- (i) 252.204-7003, Control of Government Personnel Work Product (Apr 1992)
- (ii) 52.232-1, Payments (Apr 1984).
- (iii) 52.232-8, Discounts for Prompt Payment (Feb 2002).
- (iv) 52.232-11, Extras (Apr 1984).
- (v) 52.232-25, Prompt Payment (Oct 2003).
- (vi) 252.232-7010 Levies on Contract Payments (SEP 2005)
- (vii) 52.233-1, Disputes (Jul 2002).
- (viii) 252.243-7001 Pricing of Contract Modifications (Dec 1991)
- (ix) 52.244-6, Subcontracts for Commercial Items (Dec 2004).
- (x) 52.253-1, Computer Generated Forms (Jan 1991).

(b) The Contractor shall comply with the following FAR and DFARS clauses, incorporated by reference, unless the circumstances do not apply:

(1) The clauses listed below implement provisions of law or Executive order:

(i) 52.222-19, Child Labor--Cooperation with Authorities and Remedies (Jun 2004) (E.O. 13126) (Applies to contracts for supplies exceeding the micro-purchase threshold.)

(ii) 52.222-20, Walsh-Healey Public Contracts Act (Dec 1996) (41 U.S.C. 35-45) (Applies to supply contracts over \$10,000 in the United States, Puerto Rico, or the U.S. Virgin Islands).

(iii) 52.222-35, Equal Opportunity for Special Disabled Veterans, Veterans of the Vietnam Era, and Other Eligible Veterans (Dec 2001) (38 U.S.C. 4212) (Applies to contracts of \$25,000 or more).

(iv) 52.222-36, Affirmative Action for Workers with Disabilities (June 1998) (29 U.S.C. 793) (Applies to contracts over \$10,000, unless the work is to be performed outside the United States by employees recruited outside the United States.) (For purposes of this clause, United States includes the 50 States, the District of Columbia, Puerto Rico, the Northern Mariana Islands, American Samoa, Guam, the U.S. Virgin Islands, and Wake Island.)

(v) 52.222-37, Employment Reports on Special Disabled Veterans, Veterans of the Vietnam Era, and Other Eligible Veterans (Dec 2001) (38 U.S.C. 4212) (Applies to contracts of \$25,000 or more).

(vi) 52.222-41, Service Contract Act of 1965, As Amended (Jul 2005) (41 U.S.C. 351, et seq.) (Applies to service contracts over \$2,500 that are subject to the Service Contract Act and will be performed in the United States, District of Columbia, Puerto Rico, the Northern Mariana Islands, American Samoa, Guam, the U.S. Virgin Islands, Johnston Island, Wake Island, or the outer continental shelf lands).

(vii) 52.223-5, Pollution Prevention and Right-to-Know Information (Aug 2003) (E.O. 13148) (Applies to services performed on Federal facilities).

(viii) 252.225-7001, Buy American Act and Balance of Payments Program (Jun 2005) (Applies to all contracts for supplies unless an exception is authorized by DFARS 225.1101(2)(i) through (iv).

(ix) 252.225-7013, Duty-Free Entry (Apr 2003) (Applies to all contracts for supplies except those supplies that will not enter the customs territory of the United States).

(x) 52.232-33, Payment by Electronic Funds Transfer--Central Contractor Registration (Oct 2003) (Applies when the payment will be made by electronic funds transfer (EFT) and the payment office uses the Central Contractor Registration (CCR) database as its source of EFT information.)

(xi) 52.232-34, Payment by Electronic Funds Transfer--Other than Central Contractor Registration (May 1999) (Applies when the payment will be made by EFT and the payment office does not use the CCR database as its source of EFT information.)

(xii) 252.247-7023, Transportation of Supplies by Sea (May 2002) Alternate III (May 2002) (Applies when transporting any supplies by sea under this contract.)

(2) Listed below are additional clauses that may apply:

(i) 52.204-7, Central Contractor Registration (Oct 2003) (Applies to all contracts unless an exception is authorized by FAR 4.1102(a).)

(ii) 252.204-7004, Alternate A (Nov 2003) (Applies if FAR 52.204-7 is applicable.)

(iii) 52.209-6, Protecting the Government's Interest When Subcontracting with Contractors Debarred, Suspended, or Proposed for Debarment (JAN 2005) (Applies to contracts over \$25,000).

(iv) 52.211-5 Material Requirements (Aug 2000) (Applies to contracts for supplies that are not commercial items).

(v) 52.211-17, Delivery of Excess Quantities (Sept 1989) (Applies to fixed-price supplies).

(vi) 252.225-7002, Qualifying Country Sources as Subcontractors (Apr 2003) (Applies if the contract is subject to the DFARS clause 252.225-7001, Buy American Act and Balance of Payments Program (see (b)(1)(viii) above)).

(vii) 52.243-1, Changes--Fixed Price (Aug 1987) (Applies to fixed-price contracts for supplies).

(viii) 52.243-1, Changes--Fixed Price (Aug 1987) Alternate I (Apr 1984) (Applies to fixed price contracts for services, other than architect-engineer or other professional services, and no supplies are to be furnished).

(ix) 52.243-1, Changes--Fixed Price (Aug 1987) Alternate II (Apr 1984) (Applies to fixed price contracts for services (other than architect-engineer services, transportation, or research and development) and supplies are to be furnished).

(x) 52.243-1, Changes--Fixed Price (Aug 1987) Alternate V (Apr 1984) (Applies to fixed price contracts for research and development).

(xi) 52.247-29, F.o.b. Origin (Jun 1988) (Applies to supplies if delivery is f.o.b. origin).

(xii) 52.247-34, F.o.b. Destination (Nov 1991) (Applies to supplies if delivery is f.o.b. destination).

(xiii) 52.222-42, Statement of Equivalent Rates for Federal Hires (May 1989) (Applies if the contract amount is expected to be over \$2,500 and the contract is subject to the clause 52.222-41, "Service Contract Act of 1965, As Amended" (see (b)(1)(vi) above)). In compliance with the Service Contract Act of 1965, as amended, and the regulations of the Secretary of Labor (29 CFR Part 4), this clause identifies the classes of service employees expected to be employed under the contract and states the wages and fringe benefits payable to each if they were employed by the contracting agency subject to the provisions of 5 U.S.C. 5341 or 5332.

This Statement is for Information Only:

It is not a Wage Determination

Employee Class	Monetary Wage--Fringe Benefits
_____	_____
_____	_____
_____	_____
_____	_____

(xiv) 52.246-11 Higher-Level Contract Quality Requirement (Feb 1999) (Applies to contracts when the contracting officer finds it is in the Government's interest to require that higher-level quality standards be maintained and such standards are selected and identified in the clause). The Contractor shall comply with the higher-level quality standard selected below. [If more than one standard is listed, the offeror shall indicate its selection by checking the appropriate block.]

Title	Number	Date	Tailoring
* _____	_____	_____	_____
* _____	_____	_____	_____
* _____	_____	_____	_____
* _____	_____	_____	_____

[Contracting Officer insert the title, number (if any), date, and tailoring (if any) of the higher-level quality standards.]

(c) FAR 52.252-2, Clauses Incorporated by Reference (Feb 1998). This contract incorporates one or more clauses by reference, with the same force and effect as if they were given in full text. Upon request, the Contracting Officer will make their full text available. Also, the full text of a clause may be accessed electronically at this/these address(es):

FAR clauses - <http://www.arnet.gov/far/>

DFARS clauses - <http://www.acq.osd.mil/dp/dars/dfars.html>

(d) Inspection/Acceptance. The Contractor shall tender for acceptance only those items that conform to the requirements of this contract. The Government reserves the right to inspect or test any supplies or services that have been tendered for acceptance. The Government may require repair or replacement of nonconforming supplies or re-performance of nonconforming services at no increase in contract price. The Government must exercise its post-acceptance rights--

- (1) Within a reasonable period of time after the defect was discovered or should have been discovered; and
- (2) Before any substantial change occurs in the condition of the item, unless the change is due to the defect in the item.

(e) Excusable delays. The Contractor shall be liable for default unless nonperformance is caused by an occurrence beyond the reasonable control of the Contractor and without its fault or negligence, such as acts of God or the public enemy, acts of the Government in either its sovereign or contractual capacity, fires, floods, epidemics, quarantine restrictions, strikes, unusually severe weather, and delays of common carriers. The Contractor shall notify the Contracting Officer in writing as soon as it is reasonably possible after the commencement of any excusable delay, setting forth the full particulars in connection therewith, shall remedy such occurrence with all reasonable dispatch, and shall promptly give written notice to the Contracting Officer of the cessation of such occurrence.

(f) Termination for the Government's convenience. The Government reserves the right to terminate this contract, or any part hereof, for its sole convenience. In the event of such termination, the Contractor shall immediately stop all work hereunder and shall immediately cause any and all of its suppliers and subcontractors to cease work. Subject to the terms of this contract, the Contractor shall be paid a percentage of the contract price reflecting the percentage of the work performed prior to the notice of termination, plus reasonable charges that the Contractor can demonstrate to the satisfaction of the Government, using its standard record keeping system, have resulted from the termination. The Contractor shall not be required to comply with the cost accounting standards or contract cost principles for this purpose. This paragraph does not give the Government any right to audit the Contractor's records. The Contractor shall not be paid for any work performed or costs incurred that reasonably could have been avoided.

(g) Termination for cause. The Government may terminate this contract, or any part hereof, for cause in the event of any default by the Contractor, or if the Contractor fails to comply with any contract terms and conditions, or fails to provide the Government, upon request, with adequate assurances of future performance. In the event of termination for cause, the Government shall not be liable to the Contractor for any amount for supplies or services not accepted, and the Contractor shall be liable to the Government for any and all rights and remedies provided by law. If it is determined that the Government improperly terminated this contract for default, such termination shall be deemed a termination for convenience.

(h) Warranty. The Contractor warrants and implies that the items delivered hereunder are merchantable and fit for use for the particular purpose described in this contract.

(End of clause)

Your quotation must include the following information:

Price list number and date

or

Cost breakdown by direct labor (list categories, hours and pay rates). In addition to the direct rates, provide the applicable indirect information (G&A), overhead, facilities capital cost of money (FCCM) and profit.

or

Applicable General Services Administration (GSA) contract number.

If unable to quote FOB, Destination, please complete the following:

FOB Point _____

Estimated Shipping Charge _____

Business size:

Large _____ Small _____ Nonprofit _____

Cage Code _____

Tax Identification Number (TIN) _____

DUNS _____

ELIGIBILITY REQUIREMENTS

All contractors and individuals doing business with the Federal Government must be registered at the Contractor Central Registration Database located at: <http://www.ccr.gov/>

ELECTRONIC DISTRIBUTION OF CONTRACT DOCUMENTS

All contract award and contract modification documents will be distributed electronically using the Navy Air Force Interface (NAFI) system. The contractor's copy will be provided in portable document format (pdf) as an attachment to an e-mail that will be sent to the contractor by the NAFI system. A pdf file may be accessed using Adobe Acrobat Reader software. This is a free software that may be downloaded at <http://www.adobe.com/products/acrobat/readstep.html>

Provide the following information that will be used to make electronic distribution for any resultant contract:

Name of Point of Contact to Receive

Distribution _____

Phone Number for Point of Contact _____

E-Mail Address for Receipt of Distribution _____

USE OF THE GOVERNMENT-WIDE COMMERCIAL PURCHASE CARD

Will you accept the Government-wide Commercial Purchase Card as a method of purchasing supplies and/or services.

_____ Yes _____ No

Will you accept the Government wide Commercial Purchase Card as a method of payment for your invoice.

_____ Yes _____ No

DUTY FREE ENTRY

Will any materials being shipped to the Government require a duty-free entry certificate for foreign supplies.

_____ Yes _____ No

If yes, please include dollar amount \$ _____

Note: The following provision 52.204-8 applies to this solicitation only when the solicitation includes the clause 52.213-4, Terms and Conditions—Simplified Acquisitions (Other Than Commercial Items)

52.204-8 Annual Representations and Certifications (Jan 2005)

(a)(1) If the clause at 52.204-7, Central Contractor Registration, is included in this solicitation, paragraph (b) of this provision applies.

(2) If the clause at 52.204-7 is not included in this solicitation, and the offeror is currently registered in CCR, and has completed the ORCA electronically, the offeror may choose to use paragraph (b) instead of completing the corresponding individual representations and certifications in the solicitation. The offeror shall indicate which option applies by checking one of the following boxes:

[] (i) Paragraph (b) applies.

[] (ii) Paragraph (b) does not apply and the offeror has completed the individual representations and certifications in the solicitation.

(b) The offeror has completed the annual representations and certifications electronically via the Online Representations and Certifications Application (ORCA) website at <http://orca.bpn.gov>. After reviewing the ORCA database information, the offeror verifies by submission of the offer that the representations and certifications currently posted electronically have been entered or updated within the last 12 months, are current, accurate, complete, and applicable to this solicitation (including the business size standard applicable to the NAICS code

referenced for this solicitation), as of the date of this offer and are incorporated in this offer by reference (see FAR 4.1201); except for the changes identified below [offeror to insert changes, identifying change by clause number, title, date]. These amended representation(s) and/or certification(s) are also incorporated in this offer and are current, accurate, and complete as of the date of this offer.

FAR Clause #	Title	Date	Change
_____	_____	_____	
_____	_____	_____	
_____	_____	_____	
_____	_____	_____	
_____	_____	_____	
_____	_____	_____	

Any changes provided by the offeror are applicable to this solicitation only, and do not result in an update to the representations and certifications posted on ORCA.

(End of provision)